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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/650,250	08/27/2003	Aravind Sitaraman	CISCO-7642 (032590-0212)	7193
86421	7590	11/24/2010	EXAMINER	
Patent Capital Group - Cisco 6119 McCommas Dallas, TX 75214			CHOU, ALAN S	
			ART UNIT	PAPER NUMBER
			2451	
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			11/24/2010	ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

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Office Action Summary	Application No. 10/650,250	Applicant(s) SITARAMAN ET AL.	
	Examiner ALAN S. CHOU	Art Unit 2451	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 26 August 2010.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-5 and 7-13 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-5, 7-13 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

This action is in response to amendments filed on February 1, 2010.

Claims 1-5, 7-13 are presented for examination.

Claims 14-122 are restricted.

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114. Applicant's submission filed on August 26, 2010 has been entered.

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

2. Claims 1-5, 7-9, 11-12 are rejected under 35 U.S.C. 103(a) as being unpatentable Burns et al. U.S. Patent Number 6,665,295 B1 (hereinafter Burns), further in view of Chase et al. U.S. Patent Application Publication Number 2009/0041022 A1 (hereinafter Chase), and further in view of Chen et al. U.S. Patent Application Publication Number 2008/0175250 A1 (hereinafter Chen).

3. As per claim 1, Burns discloses a network device for a destination end of a double-ended soft permanent virtual circuit (SPVC) connection (see SPVC on column 2 line 19-25), the SPVC connection coupling from a source end to the destination end via a communication network, said network device being configured to receive packets propagating in the communications network, the network device comprising: a database memory adapted to store an access identifier of at least one predetermined source network device from which the network device is allowed to accept an SPVC connection (see database 54 on column 8 line 27-35 storing unique identifier); a connection manager adapted to allocate a permanent virtual circuit (PVC) connection and a switched virtual circuit (SVC) connection on said network device (see PVC or SVC data structure on column 6 line 53-65); and an SPVC manager coupled with said database memory and said connection manager, said SPVC manager being adapted to control said connection manager and receive an SPVC connection message comprising an access identifier of a source network device (see ingress node or source point code on column 6 line 43-52), said SPVC manager being further adapted to determine if the access identifier of the source network device matches the access identifier in said database memory (see call ID matching on column 7 line 48-60).

4. Burns does not disclose expressly the access identifier comprise an alias for closed user group (CUG). Chase teaches the communication of closed user groups within a frame relay network (see page 2 section [0016]). Burns and Chase are analogous art because they are from the same field of endeavor, asynchronous transfer

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mode virtual private network systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to also allow closed user group create and use access identifiers. The motivation for doing so would have been to allow closed user group to communicate with other part of the network by requesting a connection with the SPVC network system. Therefore, it would have been obvious to combine Burns with Chase for the benefit of allow closed user group to request and create access identifier to obtain the invention as specified in claim 1.

5. Burns does not disclose expressly the SPVC connection message further comprises a service category parameter, a virtual path identifier (VPI) parameter, and peak cell rate (PCR)/sustained cell rate (SCR) parameter. Chen teaches the use of connection message with service category parameter (see page 8 section [0093]), a virtual path identifier (VPI) parameter (see VPI/VCI on page 8 section [0093] and page 1 section [0007]), and peak cell rate (PCR)/sustained cell rate (SCR) parameter (see traffic descriptor for SCR/PCR on page 3 section [0033] and page 8 section [0093]). Burns and Chen are analogous art because they are from the same field of endeavor, asynchronous transfer mode virtual private network systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to use connection message parameters to set up SPVC messages. The motivation for doing so would have been to use well established parameters to configure the SPVC network system. Therefore, it would have been obvious to combine Burns and Chase and Chen for the benefit of using a service category parameter, a virtual path identifier (VPI)

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parameter, and peak cell rate (PCR)/sustained cell rate (SCR) parameter in the connection message to obtain the invention as specified in claim 1.

6. Burns does not disclose expressly a new connection service category change request triggers an evaluation of resources available to satisfy the new connection service category change request, and wherein if the resources are not available, the new connection service category change request is rejected and a current Service category is maintained. Chen teaches the receiving of the SETUP message to request connection that causes the switch to perform bandwidth check (see SETUP message on page 8 section [0099]). Chen then teaches performing a ATM UNI CAC and an Extended Virtual UNI CAC to determine if there is enough available bandwidth to accommodate the new SETUP request (see page 8 section [0088]). Chen finally teaches sending a reject message to indicate the SETUP request for connection has failed due to not enough network resources. Burns and Chen are analogous art because they are from the same field of endeavor, asynchronous transfer mode virtual private network systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to check if there are enough resource is available before issuing new request or request changes on the ongoing network. The motivation for doing so would have been to not overloading the network system and cause pre-existing connections to fail. Therefore, it would have been obvious to combine Burns and Chase and Chen for the benefit of checking if the resource is available to initiate setup request for new or modifying connection to obtain the invention as specified in claim 1.

7. As per claim 2, Burns and Chase and Chen disclose the network device in accordance with claim 1, wherein said SPVC manager is further adapted to: accept an SPVC connection if the accepted identifier of the source network device matches the access identifier in said database memory (see call ID matching found on column 7 line 48-58 in Burns); cross-connect an incoming SVC connection leg with a PVC connection leg; and associate the PVC connection leg with the access identifier (see associate cross-connection of each node with identifier on column 3 line 25-33 in Burns).

8. As per claim 3, Burns and Chase and Chen disclose the network device in accordance with claim 3, wherein said SPVC manager is further adapted to determine if the access identifier of the source network device matches the access identifier in said database memory after finding a matching PVC connection leg in accordance with the SPVC connection message (see call ID matching is found on column 7 line 48-60 in Burns).

9. As per claim 4, Burns and Chase and Chen disclose the network device in accordance with claim 3, wherein said SPVC manager is further adapted to reject the SPVC connection if the access identifier of the source network device does not match the access identifier in said database memory (see set-up message failed on column 8 line 36-44 in Burns).

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10. As per claim 5, Burns and Chase and Chen disclose the network device in accordance with claim 1, wherein the access identifier comprises: a network service access point (NSAP) address of the source of the network device (see ingress node or source point code on column 6 line 43-51 in Burns).

11. As per claim 7, Burns and Chase and Chen disclose the network device in accordance with claim 1, wherein the communications network comprises: an Asynchronous Transfer Mode (ATM) network (see ATM on column 2 line 55-60 in Burns).

12. As per claim 8, Burns does not disclose expressly the communication network comprises a Frame Relay (FR) network. Chase teaches the asynchronous transfer mode having a frame relay interface network (see page 1 section [0006]). Burns and Chase are analogous art because they are from the same field of endeavor, asynchronous transfer mode virtual private network systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to use frame relay interface in the communication network. The motivation for doing so would have been to use a well known network interface protocol. Therefore, it would have been obvious to combine Burns with Chase for the benefit of using frame relay network communication to obtain the invention as specified in claim 8.

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13. As per claim 9, Burns and Chase and Chen disclose the network device in accordance with claim 1, wherein the source end comprises: and edge router (see routing element 1004 on Figure 12 in Chase).

14. As per claim 11, Burns and Chase and Chen disclose the network device in accordance with claim 1, wherein the destination end comprises: a destination network switch (see end-user Router Ra 919-1 on Figure 1 in Chase).

15. As per claim 12, Burns and Chase and Chen disclose the network device in accordance with claim 1, wherein the destination end comprises: a destination edge router (see routing element 1004 on Figure 12 in Chase).

16. Claims 10, 13 are rejected under 35 U.S.C. 103(a) as being unpatentable Burns et al. U.S. Patent Number 6,665,295 B1 (hereinafter Burns), further in view of Chase et al. U.S. Patent Application Publication Number 2009/0041022 A1 (hereinafter Chase), further in view of Chen et al. U.S. Patent Application Publication Number 2008/0175250 A1 (hereinafter Chen), and further in view of Chiu et al. U.S. Patent Number 6,597,689 B1 (hereinafter Chiu).

17. As per claims 10 and 13, Burns does not disclose expressly the source or destination end comprises a DSL access concentrator. Chiu teaches use of DSL access concentrator as a end source point (see column 6 line 33-40). Burns and Chiu

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are analogous art because they are from the same field of endeavor, asynchronous transfer mode virtual private network systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to use a DSL access concentrator in the communication network. The motivation for doing so would have been to use a well known network telecommunication device. Therefore, it would have been obvious to combine Burns with Chiu for the benefit of using a DSL access concentrator to obtain the invention as specified in claims 10 and 13.

18. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

a) System and Method for Managing Information for Elements in a Communication Network by Radi et al., U.S. Patent Application Publication Number 2003/0131028 A1.

b) Identifying Soft Permanent Virtual Circuits by Tooker et al., U.S. Patent Number 6,775,288 B1.

Response to Arguments

19. Applicant's arguments filed August 26, 2010 have been fully considered but they are not persuasive. The applicant asserts that the prior references do not teach expressly the newly amended limitation of a new connection service category change request triggers an evaluation of resources available to satisfy the new connection service category change request, and wherein if the resources are not available, the

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new connection service category change request is rejected and a current Service category is maintained. The examiner disagrees. Chen teaches the receiving of the SETUP message to request connection that triggers the switch to perform bandwidth check (see SETUP message on page 8 section [0099]). Chen then teaches performing a ATM UNI CAC and an Extended Virtual UNI CAC to determine if there is enough available bandwidth to accommodate the new SETUP request (see page 8 section [0088]). Chen finally teaches sending a reject message to indicate the SETUP request for connection has failed due to not enough network resources. Burns and Chen are analogous art because they are from the same field of endeavor, asynchronous transfer mode virtual private network systems. At the time of the invention it would have been obvious to a person of ordinary skill in the art to check if there are enough resource is available before issuing new request or request changes on the ongoing network. The motivation for doing so would have been to not overloading the network system and cause pre-existing connections to fail. Therefore, it would have been obvious to combine Burns and Chase and Chen for the benefit of checking if the resource is available to initiate setup request for new or modifying connection to obtain the invention as specified in claim 1

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Alan S. Chou whose telephone number is (571) 272-5779. The examiner can normally be reached on 7am-3pm.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Follansbee can be reached on (571)272-3964. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

AC

/John Follansbee/

Supervisory Patent Examiner, Art Unit 2451